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Comprehensive Techniques in CSF Leak Repair and Skull Base Reconstruction

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I would like thank both my mentors and students from whom I continue to learn how to better care for our patients. Most importantly, I dedicate this book to my wife whose love and support form the foundation upon which any of my accomplishments rest.
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Preface

The discipline of endoscopic skull base surgery has evolved profoundly in the past several decades fueled largely by advances in imaging, instrumentation and endoscopic techniques. The collaboration of neurosurgical and otolaryngologic surgeons has led to the elaboration of a series of endoscopic corridors that may be used to approach and resect lesions involving multiple subsites along the cranial base. As the indications for these approaches continue to expand, the ability to reconstruct the skull base in an immunocompetent and watertight fashion has emerged as a critical rate-limiting factor. Borrowing from traditional methods in open reconstruction and neurotologic surgery, early reconstructive approaches relied on multilayer free grafts. As defect size increased however, the failure rates associated with avascular tissue repairs provided the impetus for the development of a variety of intranasal and extranasal flap techniques. These methods have been remarkably successful resulting in dramatic reductions in postoperative cerebrospinal fluid leaks and overall morbidity.

This textbook represents a detailed exposition of the techniques required for successful skull base reconstruction written by many of the world experts who have played an important role in the expansion of this rapidly evolving field. Through textual descriptions, figures, and endoscopic videos, readers of all levels of endoscopic expertise will be able to use this book to improve and refine their techniques.

While this text represents the current state of the art in cerebrospinal fluid leak and skull base repair, the final chapter covers new technologies which are beginning to appear on the horizon and may continue to push the boundaries of what is possible using current approaches.

Endoscopic skull base surgery has allowed for the management of complex lesions in a minimally invasive fashion resulting in improved quality of life and decreased hospital stays. Advances in techniques of cranial base reconstruction have been crucial to the progression of this field. This textbook is written as a practical guide to enable the skull base surgeon to understand all the reconstructive options currently available and to maximize success in the management of these complex patients.

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